DOCUMENT RESUME

ED 360 373 TM 020 277

AUTHOR Rathunde, Kevin
TITLE The Motivational Importance of Extracurricular Activities for Adolescent Development: Cultivating Undivided Attention.
PUB DATE Apr 93
NOTE 9p.; Paper presented at the Annual Meeting of the American Educational Research Association (Atlanta, GA, April 12-16, 1993).
PUB TYPE Reports - Research/Technical (143) -- Speeches/Conference Papers (150)

EDRS PRICE MF01/PC01 Plus Postage.
DESCRIPTORS Academically Gifted; *Adolescent Development; Adolescents; After School Programs; *Attention; *Extracurricular Activities; High Schools; *High School Students; Longitudinal Studies; Public Schools; Research Methodology; Student Experience; Student Interests; *Student Motivation
IDENTIFIERS *Experience Sampling Method

ABSTRACT

Activities that engaged the full attention of adolescents at school were explored using the Experience Sampling Method, in which subjects were interrupted by a pager to record their experience at the moment the pager signaled. Two variables indicating optimal subjective experience and undivided attention were operationalized: interest and flow experience. The data were from a longitudinal study of 200 teenagers talented in mathematics, science, music, athletics, and/or arts. Results show that extracurriculars are the most likely school activities to engage teenagers fully; they combined feelings of spontaneous involvement with a focus on important goals, and perceptions of high skill with correspondingly high challenges. In contrast, the two most common school activities--productive work and socializing--disjoined and polarized these important dimensions of experience. Findings are discussed in terms of the important role extracurricular activities may play in cultivating habits of undivided attention in adolescents, and the current trend in public education to eliminate such after-school programs. One table and two figures illustrate the study findings. (SLD)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

U.S. DEPARTMENT OF EDUCATION
Office of Educational Research and Improvement
EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)
This document has been reproduced as received from the person or organization originating it.
Minor changes have been made to improve reproduction quality.
Points of view or opinions stated in this document do not necessarily represent official OERI position or policy.

"PERMISSION TO REPRODUCE THIS MATERIAL HAS BEEN GRANTED BY
KEVIN RATHUNDE
TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

ED360373

ABSTRACT

THE MOTIVATIONAL IMPORTANCE OF EXTRACURRICULAR ACTIVITIES FOR ADOLESCENT DEVELOPMENT: CULTIVATING UNDIVIDED ATTENTION

Kevin Rathunde. Family and Consumer Studies, University of Utah, Salt Lake City, Utah 84112

This study explored which activities engaged adolescents' full attention at school. Using the Experience Sampling Method, two variables indicating optimal subjective experience and undivided attention were operationalized: *interest* and *flow experience*. The data were from a longitudinal study of 200 talented teenagers. Results showed that extracurriculars were the most likely school activities to fully engage teenagers: they combined feelings of spontaneous involvement with a focus on important goals, and perceptions of high skills with correspondingly high challenges. In contrast, the two most common school activities -- productive work and socializing -- disjoined and polarized these important dimensions of experience. The findings are discussed in terms of the important role extracurriculars may play in cultivating habits of undivided attention in adolescents, and the current trend in public education to eliminate such after school programs.

TM 020277

BEST COPY AVAILABLE

INTRODUCTION

Which school activities are the most rewarding for teenagers and engage their full attention? Despite the fact that this question is often asked by teachers and parents in daily life, little research has attempted to answer it. The primary obstacle has been methodological, that is, the inability to systematically sample experience in natural settings. Thus the present study used the Experience Sampling Method (ESM) (Csikszentmihalyi, Larson, & Prescott, 1977) -- electronic pagers with corresponding self-report forms -- to record the experience of students while in school.

Adolescence is a stage of life during which the productive habits formed at school could have profound implications for adult work roles (Csikszentmihalyi, Rathunde, & Whalen, 1993). The present study used the ESM to operationalize two related variables that disclose states of undivided attention -- interest and flow experience. Interest is defined as the combination of spontaneous involvement and goal-direction (Dewey, 1913); flow is distinguished by the coordination of high skills and challenges (Csikszentmihalyi, 1990). Knowing which activities promote interest or flow, and which ones do not, is important for understanding how attentional habits are socialized in schools.

METHOD

Subjects were approximately 200 predominantly white, middle-class adolescents nominated by their teachers as having unusual talent in math, science, music, athletics, and art.

The students responded to the Experience Sampling Method for one week early in high school (N = approx. 3500 signals). Students were sent 7-9 random signals daily between the hours of 7:00 a.m. and 10:00 p.m. during the week and 7:00 a.m. and midnight on the weekends.

"Undivided attention" was operationalized in two ways. First, interest was defined as times when a teenager reported feeling above average spontaneous involvement (i.e., open + excited + involved, 7-point semantic differential items, alpha = .81), *and* above average goal-direction (i.e., that an activity was important to the student's goals, a 10-point Likert item). Second, flow experience was designated as times when a student perceived high skills *and* high challenges in regards to a particular activity (10-point Likert items).

Z-scores were computed on the individual items described above, allowing the discrimination of above or below average. Percentages were then computed to indicate *how often* a particular activity could be classified as interest or flow.

RESULTS

The results presented below focus on extracurriculars in comparison to the most frequently reported activities in high school -- schoolwork and socializing. The latter two account for about 75% of teenagers' time.

Figures 1 & 2 summarize z-scores for the variables; "0" indicates average teenage experience. Oneway ANOVAs across type of activity resulted in the following significant differences (spontaneous: $F = 63.4$, $p < .0001$; goal-directed: $F = 53.7$, $p < .0001$; skills: $F = 8.3$, $p < .001$; challenges: $F = 126.1$, $p < .0001$). The figures illustrate that schoolwork was characterized by below average skills and above average challenges, and below average spontaneous involvement and above average goal-direction; socializing showed the exact *opposite* profile; and extracurricular activities combined high skills and challenges, and high spontaneity and goal-direction.

Table 1 breaks down each activity in terms of the number of responses falling above or below the various means. Results showed that extracurriculars resulted in the highest amounts of interest and flow (approx. 45-50% of the signals). Schoolwork was most often characterized by students as "anxiety" and "drudgery," and socializing led to states of "boredom" and "fooling." Chi-square analyses were significant ($p < .0001$).

DISCUSSION

Schoolwork and socializing are the primary "work" and "leisure" activities of teenagers. These two activities alone account for about 75% of the time teens spend at school. Results of this study show that these activities often reinforce states of divided attention. In other words, teens perceive productive activities as important and challenging, but they often feel uninvolved and relatively unskilled when doing them. Socializing, on the other hand, often fractures attention in the opposite way: teens report feeling spontaneously involved and capable, but undirected toward goals and unchallenged.

If it is true, as many studies suggest, that children's attitudes about school can influence adult productive roles, and that adolescence is a crucial time for the formation of positive attitudes, then the results of this study are disconcerting, especially in light of the current national trend to eliminate extracurricular programs for budgetary reasons. Extracurriculars -- in comparison to *all* other school activities -- are the most consistent source of interest and flow for students. If for no other reason, then, such activities are crucial for alerting teenagers to the fact that important work isn't always aversive and alienating, and that activities that are exciting and involving needn't be devoid of challenge.

REFERENCES

Csikszentmihalyi, M. (1990). Flow. New York: Harper & Row.

Csikszentmihalyi, M., Larson, R., & Prescott, S. (1977). The ecology of adolescent activity and experience. Journal of Youth and Adolescence, 6, 281-294.

Csikszentmihalyi, M., Rathunde, K., & Whalen, S. (in press). Talented teenagers: The roots of success and failure. New York: Cambridge University Press.

Dewey, J. (1913). Interest and effort in education. Cambridge, MA: The Riverside Press.

Rathunde, K. (in press). The experience of interest: A theoretical and empirical look at its role in adolescent talent development. In P. Pintrich & M. Maehr (Eds.), Advances in Motivation and Achievement , Vol. 8. Greenwich, CT: JAI Press.

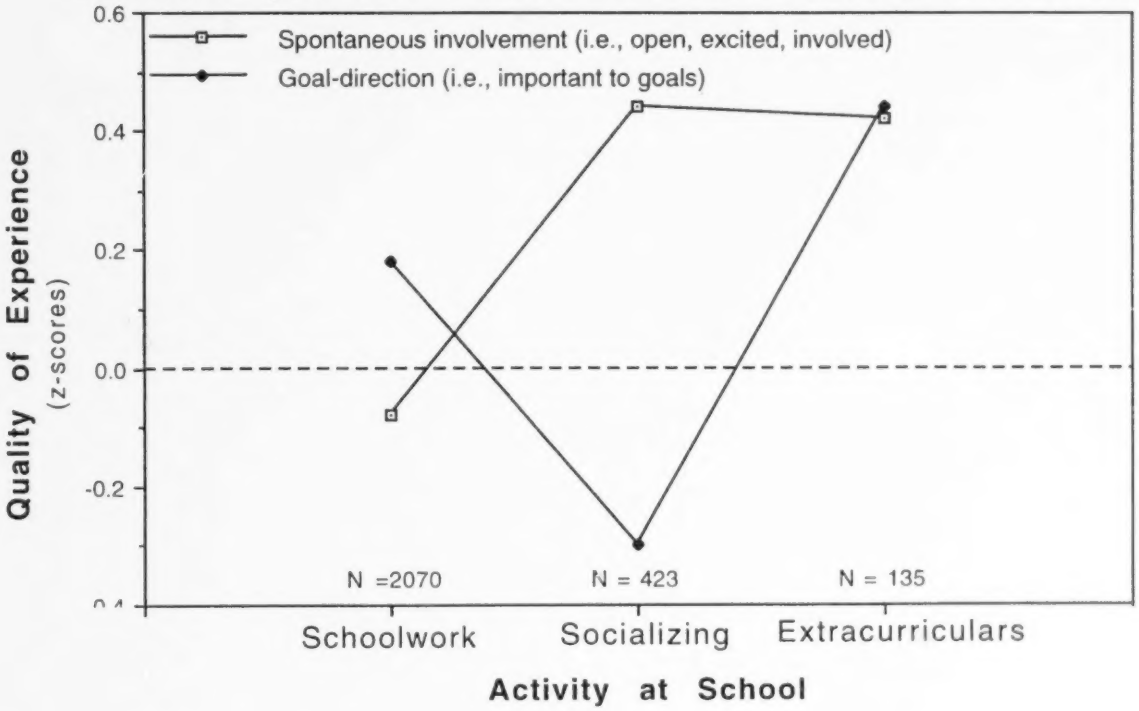
Rathunde, K. & Csikszentmihalyi, M. (in press). Undivided interest and the growth of talent: A longitudinal study of adolescents. Journal of Youth and Adolescence, 22.

Table 1
Students' Percentages of Interest and Flow at School

Type of Activity (N)	High Spontaneous High Goals **Interest**	High Spontaneous Low Goals **Fooling**	Low Spontaneous High Goals **Drudgery**	Low Spontaneous Low Goals **Disinterest**
Schoolwork (2070)	27.1	15.8	**29.9**	27.2
Socializing (423)	23.6	**43.1**	11.3	21.9
Extracurricular (135)	**49.2**	21.3	18.0	11.5

Type of Activity (N)	High Skill High Challenge **Flow**	High Skill Low Challenge **Boredom**	Low Skill High Challenge **Anxiety**	Low Skill Low Challenge **Apathy**
Schoolwork (2070)	28.5	16.6	**34.4**	20.5
Socializing (423)	14.5	**38.8**	13.6	33.1
Extracurricular (135)	**44.0**	14.9	25.4	15.7

Students' Spontaneous Involvement and Goal-Direction at School



Students' Skills and Challenges at School